

ABSTRACT OF THE DISCLOSURE

The present invention facilitates proper control of the scavenging air and fuel-air mixture for a stratified scavenging two-cycle engine that is based on a crankcase compression/scavenging method, using any carburetor. The present invention includes a drive member, which rotates based on an accelerator operation, installed on the air valve of the air passage, wherein the drive member is movable through angular reciprocal movements. A slave member, which constantly contacts a cam provided on the drive member is installed on the throttle valve of the carburetor, and wherein the slave member is movable through linear reciprocal movements. A fuel flow-rate controlling mechanism works in cooperation with these linear reciprocal movements. The carburetor can be freely designed without regard to the orientation of the air passage and a looseness- and play-free interlocking mechanism having a cam and a spring can maintain the air valve and the throttle valve in a proper opening relationship, thereby stably operating the engine without upsetting the air/fuel ratio.